

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT3707312

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT	
<b>NATURE OF CONVEYANCE:</b>	SECURITY INTEREST	
<b>CONVEYING PARTY DATA</b>		
<b>Name</b>		<b>Execution Date</b>
DOMINION VOTING SYSTEMS INC.		01/21/2016
<b>RECEIVING PARTY DATA</b>		
<b>Name:</b>	ROYAL BANK OF CANADA	
<b>Street Address:</b>	260 EAST BEAVER CREEK ROAD, SUITE 201	
<b>City:</b>	RICHMOND HILL, ONTARIO	
<b>State/Country:</b>	CANADA	
<b>Postal Code:</b>	L4B 3M3	
<b>PROPERTY NUMBERS Total: 24</b>		
<b>Property Type</b>	<b>Number</b>	
Patent Number:	8844813	
Patent Number:	8913787	
Patent Number:	9202113	
Patent Number:	8195505	
Application Number:	13463536	
Application Number:	13525187	
Application Number:	13525208	
Patent Number:	7111782	
Patent Number:	7422151	
Patent Number:	D599131	
Patent Number:	D521050	
Patent Number:	D515619	
Patent Number:	D521051	
Patent Number:	D537469	
Patent Number:	8714450	
Patent Number:	8910865	
Patent Number:	8864026	
Patent Number:	8876002	
Patent Number:	5635726	
Patent Number:	6194698	

PATENT

Property Type	Number
Patent Number:	5248872
Patent Number:	D378173
Patent Number:	D319459
Patent Number:	D312251

#### CORRESPONDENCE DATA

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<b>ATTORNEY DOCKET NUMBER:</b>	64329 -NEW
<b>NAME OF SUBMITTER:</b>	JAMES H. JOHNSON, JR.
<b>SIGNATURE:</b>	/James H. Johnson, Jr./
<b>DATE SIGNED:</b>	01/22/2016

#### Total Attachments: 4

source=21-Jan-2016 Fully Executed Patent Security Agreement (3)#page1.tif  
source=21-Jan-2016 Fully Executed Patent Security Agreement (3)#page2.tif  
source=21-Jan-2016 Fully Executed Patent Security Agreement (3)#page3.tif  
source=21-Jan-2016 Fully Executed Patent Security Agreement (3)#page4.tif

**EXECUTION VERSION**

**PATENT SECURITY AGREEMENT**

This Patent Security Agreement (this "**Patent Security Agreement**") is made as of January 21, 2016, by **DOMINION VOTING SYSTEMS INC.**, a Delaware corporation ("**Guarantor**"), in favor of **ROYAL BANK OF CANADA** (together with its successors and assigns in such capacity, "**Grantee**").

**WHEREAS**, the Guarantor holds all right, title and interest in the letter patents, design patents and utility patents listed on the attached Schedule A, which patents are issued or applied for in the United States Patent and Trademark Office (the "**Patents**");

**WHEREAS**, the Guarantor has entered into a U.S. Guaranty and Collateral Agreement, dated December 23, 2015 (as amended, restated, supplemented, modified or otherwise changed from time to time, the "**Security Agreement**"), in favor of Grantee; and

**WHEREAS**, pursuant to the Security Agreement, the Guarantor has granted to the Grantee for its benefit (as defined in the Security Agreement), a continuing security interest in all right, title and interest of the Guarantor in, to and under the Patents and the applications and registrations thereof, and all proceeds thereof, including, without limitation, any and all causes of action which may exist by reason of infringement thereof and any and all damages arising from past, present and future violations thereof (the "**Collateral**"), to secure the payment, performance and observance of the Secured Obligations (as defined in the Security Agreement).

**NOW, THEREFORE**, as collateral security for the payment, performance and observance of all of the Secured Obligations, for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the Guarantor does hereby grant to the Grantee and grant to the Grantee for its benefit, a continuing security interest in the Collateral to secure the prompt payment, performance and observance of the Secured Obligations.

All capitalized terms used but not otherwise defined herein have the meanings given to them in the Security Agreement.

The Guarantor does hereby further acknowledge and affirm that the rights and remedies of the Grantee with respect to the Collateral are more fully set forth in the Security Agreement, the terms and provisions of which are hereby incorporated herein by reference as if fully set forth herein.

This Patent Security Agreement may be executed in any number of counterparts and by different parties in separate counterparts, each of which when so executed shall be deemed to be an original and all of which taken together shall constitute one and the same agreement. Delivery of an executed counterpart by facsimile or electronic mail shall be equally effective as delivery of an original executed counterpart.

*[Remainder of page intentionally left blank]*

*(Signature Page to Patent Security Agreement)*

**IN WITNESS WHEREOF**, the Guarantor has caused this Patent Security Agreement to be duly executed by its officer thereunto duly authorized as of the date first set forth above.

GUARANTOR:

**DOMINION VOTING SYSTEMS INC.**, a  
Delaware corporation

By: 

Name: John George Poulos

Title: President, Treasurer and Secretary

# SCHEDULE A TO GRANT OF A SECURITY INTEREST

Title	COUNTRY	SERIAL #	FILED DATE	PATENT NO.	ISSUE DATE	STATUS
Electronic Correction of Voter-Marked Paper Ballot	US	13/476,836	5/21/2012	8,844,813	9/30/2012	Issued
Ballot Adjudication in Voting Systems Utilizing Ballot Images	US	13/470,091	5/11/2012	8,913,787	12/16/2014	Issued
Ballot Adjudication in Voting systems Utilizing Ballot Images	US	14/539,684	11/12/2014	9,202,113	12/1/2015	Allowed
System, Method and Computer Program for Vote Tabulation with an Electronic Audit Trail	US	11/121,997	5/5/2005	8,195,505	6/5/2012	Issued
System, Method and Computer program for Vote Tabulation with an Electronic Audit Trail	US	13/463,536	5/3/2012			On Appeal - Appeal No. 2014-03595
System, Method and Computer Program for Vote Tabulation with an Electronic Audit Trail	US	13/525,187	6/15/2012			On Appeal - Appeal No. 2014- 009362
System, Method and Computer Program for Vote Tabulation with an Electronic audit Trail	US	13/525,208	6/15/2012			On Appeal - Appeal No. 2014- 003066
Systems and Methods for Providing Security in a Voting Machine	US	10/811,969	3/30/2004	7,111,782	9/26/2006	Issued
Systems and Methods for Providing Security in a Voting Machine	US	11/526,028	9/25/2006	7,422,151	9/9/2008	Issued
Voting Booth	US	29/324,281	9/10/2008	D599,131	9/1/2009	Issued
Voting Terminal and Stand	US	29/209,554	7/15/2004	D521,050	5/16/2006	Issued
Pair of Enclosure Doors	US	29/209,579	7/15/2004	D515,619	2/21/2006	Issued
Voting Terminal	US	29/209,556	7/15/2004	D521,051	5/16/2006	Issued
Voting Terminal and Keypad	US	29/254,483	2/23/2006	D537,469	2/27/2007	Issued
Systems and Methods for Transactional Ballot Processing, and Ballot Auditing	US	13/092,600	4/22/2011	8,714,450	5/6/2014	Issued
Ballot Level Security Features for Optical Scan Voting Machine Capable of Ballot Image Processing, Secure Ballot Printing, and Ballot Layout Authentication and Verification	US	13/092,599	4/22/2011	8,910,865	12/16/2014	Issued
Ballot Image Processing System and Method for Voting Machines	US	13/092,606	4/22/2011	8,864,026	10/21/2014	Issued

Title	COUNTRY	SERIAL #	FILED DATE	PATENT NO.	ISSUE DATE	STATUS
Systems for Configuring Voting Machines, Docking Device for Voting Machines, Warehouse Support and Asset Tracking of Voting Machines	US	13/092,604	4/22/2011	8,876,002	11/4/2014	Issued
Electro-Optical Sensor for Marks on a Sheet	US	08/545,298	10/19/1995	5,635,726	6/3/1997	Issued
Electro-Optical Sensor Circuitry	US	08/748,562	11/13/1996	6,194,698	2/27/2001	Issued
Device for Optically Reading Marked Ballots Using Infrared and Red Emitters	US	07/740,808	8/6/1991	5,248,872	9/28/1993	Issued
Systems and Methods for Providing Security in a Voting Machine	US	10/811,969	3/30/2004	7,111,782	9/26/2006	Issued
Voting Booth	US	29/051,389	3/8/1996	D378,173	2/25/1997	Issued
Voting Machine	US	07238933	8/31/1988	D319459	8/27/1991	Issued
Memory Cartridge for Electronic Voting System	US	07240558	8/31/1988	D312251	11/20/1990	Issued